Title (en)

OBJECT TRACKING WITH PROJECTED REFERENCE PATTERNS

Title (de)

OBJEKTVERFOLGUNG MIT PROJIZIERTEN REFERENZMUSTERN

Title (fr)

SUIVI D'OBJETS AVEC MOTIFS DE RÉFÉRENCE PROJETÉS

Publication

EP 2697697 B1 20170503 (EN)

Application

EP 12771045 A 20120323

Priority

• US 201113084895 A 20110412
• US 2012030478 W 20120323

Abstract (en)

[origin: US2012262365A1] Systems and methods for tracking an object's position and orientation within a room using patterns projected onto an interior surface of the room, such as the ceiling. Systems include at least one optical position sensitive device embedded in the object to detect relative changes in the projected pattern as the object's position and/or orientation is changed. In particular systems, the pattern includes a plurality of beacons projected by one or more steerable lasers. Projected beacons may be steered automatically to accommodate a variety of room topologies. Additional optical position sensitive devices may be disposed in known physical positions relative to the projected pattern to view either or both the projected pattern and the object. A subset of object positional data may be derived from a video camera viewing the object while another subset of object positional data is derived from the projected pattern.

IPC 8 full level

G01S 1/72 (2006.01); **G06F 3/01** (2006.01); **G06F 3/03** (2006.01); **G06F 3/0346** (2013.01)

CPC (source: EP KR US)

G01S 1/725 (2013.01 - EP US); **G06F 3/011** (2013.01 - KR); **G06F 3/017** (2013.01 - EP US); **G06F 3/03** (2013.01 - KR); **G06F 3/0325** (2013.01 - EP US); **G06F 3/0346** (2013.01 - EP US)

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